

REMARKS/ARGUMENTS

Claims 1, 4, 6-8, and 10-33 remain in the application. Claims 1, 6, 8, 10, 32, and 33 are amended. Claim 3 is canceled. Claims 2, 4, 7, and 11-31 were previously withdrawn as the result of restriction and election of species requirements.

Claims 1, 6, 8, 10, 32, and 33 are amended to recite that the tabs are planar, and claims 1, 6, 8, 10, and 33 are further amended to recite that the second tab is longitudinally adjacent to the first tab; the recital of canceled claim 3 is incorporated into amended claim 1. Support for these amendments may be found in, for example, paragraph [0025]-[0027] of Applicant's specification and Applicant's FIGS. 1-9.

Claim Rejections – 35 U.S.C. § 102

The Examiner entered Applicant's amendments dated July 8, 2008, and in his Advisory Action stated that the amended claims do not define over the prior art. The original Examiner had previously rejected claims 1, 3, 6, 8, and 10 under 35 USC § 102(b) as being anticipated by US Patent No. 1,074,242 to Caldwell.

Caldwell discloses a "metal structure" that serves the function of a structure, stud, or joist. *See* Caldwell col. 1, lines 31-33. The metal structure of Caldwell is primarily structural framing to take the place of wood studs and joists or to support a wall. *See* Caldwell col. 1, lines 12-23. Plaster boards 2 or equivalent are held in place with the metal structure, which have angled flanges 3 and bendable tangs 4. *See* Caldwell col. 1, line 52 to col. 2, line 66 and FIG. 2. As shown in FIG. 2, each flange has an opposing flange across from it, such that at any given position along the longitudinal axis of the

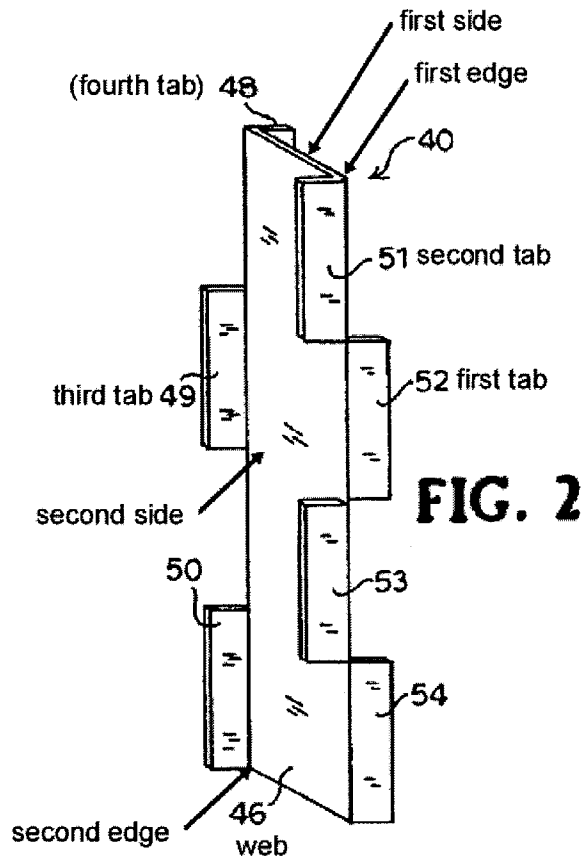
metal structure the cross-sectional shape is a “U.” The paired flanges of Caldwell are not readily accessible from a single side; direct access to any flange from across the metal structure is impeded by a corresponding flange.

Independent claim 1 as previously amended recites tabs that effectively form a “Z” shape or inverted “Z” shape in cross-section. Amended claim 1 requires alternating tabs, in that that the first tab extends in one direction and the second tab, longitudinally adjacent to the first tab, and third tab, in longitudinal registration with the first tab, extend in an opposite direction. “Bending opposing tabs in opposite directions provides clear, open access to the surface of the tab that is to be attached to a framing member.” Applicant’s specification at paragraph [0026]. Caldwell discloses no such structure.

Thus, a “Z” or inverted “Z” shape results from the amended claim 1 recited configuration of the tabs. This is distinct from the wall supporting studs and structure of Caldwell.

Claim 10 as amended recites first, second, and third tabs, with the first and third tabs in longitudinal registration, and second tab longitudinally adjacent to the first tab, similarly to amended claim 1. The second and third tabs extend in a direction opposite of that of the first tab. In addition, a fourth tab is added, “extending from the second edge at approximately a 90 degree angle from the first side in the same direction as that of the first tab,” and the second and fourth tabs are in longitudinal registration. As may be seen from the annotated Caldwell FIG. 1 in the Office Action, Caldwell does not satisfy the recital that the first and fourth tabs must be bent in opposite directions as compared to the second and third tabs while concurrently the first and third tabs are in longitudinal registration and second and fourth tabs are in longitudinal registration.

The following figure, FIG. 2 from Applicant's application annotated with words, illustrates one embodiment of a thermal framing component 40 Applicant's invention as recited in amended claims 1 and 10:



Claims 1 and 10 are also amended to recite that the tabs are planar. Planar tabs allow mounting to the front surface of framing members with screws or nails through the tabs and the front surface of the framing members. This also makes it possible for the thermal framing component to be moved laterally when attached to horizontal top and bottom plates. Such movement allows placement of the thermal framing components at locations determined by the vertical edge of a sheet of insulation, not necessarily at a vertical stud.

In order for a reference to anticipate a claimed invention, the reference must teach each and every element in the precise arrangement set forth in the claim. If the reference fails to teach even one of the claimed features, the reference does not and cannot anticipate the claimed invention. Based upon at least the structural deficiencies of the disclosure in Caldwell identified in the preceding remarks, Applicant respectfully requests that the rejections of claims 1 and 10 be withdrawn. In addition, there is no teaching or suggestion in Caldwell to alternate direction of bending tabs along a longitudinal axis in configuring a thermal framing component.

Dependent claims 6 and 8 depend from independent amended claim 1. Because of those dependencies, these claims contain all of the features of their base independent claim. Therefore, such claims are submitted to be patentably distinguishable over Caldwell. In addition, amended claim 6 and 8 recite the direction in which the referred to tabs are disposed, further distinguishing these claims over Caldwell.

The Examiner rejected claim 32 under 35 USC § 102(b) as being anticipated by US Patent No 6,711,867 to Smith ("Smith").

Smith is directed to a self-jigging resilient construction member and retrofit system using same, and specifically discloses resilient webs 506, shown mounted to a lateral member 502 in Smith's FIG. 9. The resilient webs 506, and 406 in FIG. 10, include a first portion 406a, a second portion 406b bent at an angle to first portion 406a, and a third portion 406c bent at an angle to second portion 406b. The first and third portions are generally parallel. The resilient members 406, 506 may be provided with spacers 410, 412, 510, 512 to space the resilient members 406, 506 from the lateral members 402, 404, 502.

As amended, claim 32 recites a plurality of planar tabs extending from the first edge and a plurality of planar tabs extending from the second edge. Tabs extending from a first longitudinal position and from opposite edges form a “Z” shape with the web. Tabs that extend from a second longitudinal position that is adjacent to the first longitudinal position, and that extend from opposite edges, form an inverted “Z” shape with the web. Smith does not disclose such a structure with a plurality of tabs extending from each side (only a first portion 406a extends from one edge of the second portion 406b, and only a third portion 406c extends from the other edge of the second portion 406b), and accordingly Smith cannot have tabs in one member that form both a “Z” shape and an inverted “Z” shape. Based upon at least these structural deficiencies of the disclosure in Smith, Applicant respectfully requests that the rejection of claim 32 be withdrawn.

Claim Rejection – 35 USC § 103

The Examiner rejected claim 33 under 35 USC § 103(a) as being unpatentable over Caldwell in view of US Patent No. 5,269,109 to Gulur (“Gulur”).

Longitudinally between flanges 3, Caldwell has bendable tangs 4. Boards 2 are inserted between the outside of the flanges 3 and the inside of the bent tangs 4. See Caldwell lines 52-66. No material is disposed or is intended to be disposed between the flanges 3.

Gulur is directed to an insulated load bearing wall and roof system. Tubular frame members are incorporated into the core of the wall, and are surrounded by foam core sections on the sides and foam side sheets on front and back. See Gulur FIG. 4 and

col. 3, lines 39-44.

Neither reference teaches or suggests tabs that form a slot for any product, let alone rigid insulation. Further, amended claim 33 recites planar tabs in a non-structural, non-load bearing thermal framing component where the first and third tabs are in longitudinal registration, the first and second tabs are longitudinally adjacent, and the second and third tabs form a longitudinal insulation slot. For numerous reasons, claim 33 is nonobvious over these references. The principle of operation of Caldwell is to hold boards *outside of* the flanges. To place insulation between the Caldwell flanges is contrary to the principle of operation of Caldwell. Also, the Caldwell tangs extend outward, and cannot work with the foam side sheets of Gulur, which would obstruct the tangs since there is no joint in the sheets at the tubular members. In addition, the tubular member of Gulur has no tabs at all, and is a structural member; other features hold the insulation in place.

As one important factor to consider, there is no teaching, suggestion, or motivation, either in the references or in common knowledge, to combine the references to achieve the claimed invention. Further, one may not pick and choose from the features of cited art, namely, selected flanges from Caldwell (which are not used to hold anything between them) and general use of insulation of Gulur; the art must be taken as a whole. It is therefore impermissible hindsight to combine Caldwell and Gulur.

Therefore, neither reference individually nor the references in combination teach or suggest a structure that includes tabs that form a slot for rigid insulation. Such teachings or suggestions of the claimed structure are required to establish *prima facie* obviousness. See MPEP § 2143.03. Accordingly, there is no *prima facie* obviousness,

and Applicant's claim 1 is nonobvious over Caldwell in view of Gulur.

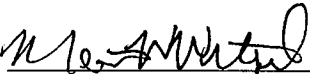
CONCLUSION

In view of the foregoing amendments and remarks, Applicant submits that all claims are now in condition for allowance. Accordingly, allowance of such claims is respectfully requested. If the Examiner has any questions about the present Amendment a telephone interview is requested.

Respectfully submitted,

Donald R. Moody
(Applicant)

Date: 19 August 2008

By: 
Matthew W. Witsil
Registration No. 47,183
Moore & Van Allen PLLC
430 Davis Drive, Suite 500
P.O. Box 13706
Research Triangle Park, NC 27709
Telephone: (919) 286-8000
Facsimile: (919) 286-8199